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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/762.126

01/21/2004

Yuji Kobayashi

CANO:116

4104

ROSSI & ASSOCIATES
P.O. Box 826
Ashburn, VA 20146-0826

7590

03/02/2007

EXAMINER

NGUYEN, CAM LINH T

ART UNIT

PAPER NUMBER

2161

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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3 MONTHS

03/02/2007

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary

Application No.

10/762,126

Applicant(s)

KOBAYASHI, YUJI

Examiner

CamLinh Nguyen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 January 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-8, 11, 13, 15 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-8, 11, 13, 15 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f):
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. This Office Action is response to communication filed on 1/3/2007.
2. Applicant's amendments to claims 1 – 16 are acknowledged. Consequently, claims 8 – 9, 12, 14, and 16 have been cancelled. Rejections to claims 1- 8, 11, 13 - 15 are withdrawn. Claims 1 – 8, 11, 13, and 15 are currently pending.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1 – 8, 11, 13, and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morton et al (U.S. 2005/0216443 A1) in view of Yasujima et al (U.S. 4,944,022).

♦ As per claims 1, 11, 13, 15,

Morton discloses an information searching apparatus/ method/computer readable medium/ program comprising:

- “An index information registering device that registers a word extracted from a document in association with the document as index information for document search”

- corresponds to the relevance interval calculation server device that registers the data into the search index 120 (Fig. 9, element 120, paragraph 0086 of Morton).
- “A document searching device that searches a document corresponding to information relating to a requested search by referring to the index information registered by said index information registering device” corresponds to the client device that searches a document corresponding to information relating to a requested search by referring to the index information registered by said index information registering device (Fig. 9 of Morton).
 - “An unknown extracting device that extracts an word from the document being searched” corresponds to Data analysis and Extraction server 122 in Fig. 9, paragraphs 0066, 0091 – 0093 of Morton. Morton discloses that information is extracted using the optical character recognition (OCR) (paragraph 0093 of Morton). Applicant also uses the OCR for extracting the unknown word. Therefore, the OCR in Morton corresponds to the unknown extracting device in the instant claimed invention.
 - “A document type determining device that determines whether a type of the document being searched is a recognition processed document” corresponds to the named entity identification module 107 (See paragraph 0172, 0060 of Morton).
 - “And a registration permitting/inhibiting deciding device that decides, when the type of the document being searched is the recognition processed document, to inhibit said index information registering device from registering as the index information the unknown word extracted from the document being searched by said unknown word extracting device” corresponds to the relevance interval calculation server device that registers the

data into the search index 120 (Fig. 9, element 120, paragraph 0086 of Morton). Also see paragraph 0058 – 0060 of Morton.

Morton does not clearly disclose the extracting device extracts an unknown word, which is not in a dictionary. However, it is a well-known technique in the art. Yasujima provided an example. Yasujima teaches that the OCR recognizes the unknown word from the image data and corrects the unknown word using the data dictionary (col. 1, lines 5 – 41 of Yasujima). In Fig. 11, Yasujima teaches a method for “registration a file name” and “registration and addition of character” (col. 9, lines 18 – 20 of Yasujima). Therefore, if the unknown word which is not in a dictionary, (word that does not match with the dictionary), the system of Yasujima also can be able to register that unknown word into the system; and also determined if the file is the “recognition processed file” (Fig. 12 of Yasujima). The OCR in Yasujima also is the character correcting device. As the result, Yasujima teaches “A document type determining device that determines whether a type of the document being searched is a recognition processed document” and “a registration permitting/inhibiting deciding device that decides, when the type of the document being searched is the recognition processed document, to inhibit said index information registering device from registering as the index information the unknown word extracted from the document being searched by said unknown word extracting device”.

It would have been obvious to one with ordinary skill in the art at the time the invention was made to apply the teaching of Yasujima into the invention of Morton because the combination would produce the user more accurate result by using the OCR to extract the unknown word and using a data dictionary to correct the unknown word or to register additional unknown word into the system without duplicate the records.

♦ As per claims 2 - 3, the combination of Morton and Yasujima disclose:

- “Said document type determining device determines whether the type the document being searched is a character recognition processed document including character codes obtained by a character recognition process, and said registration permitting/inhibiting deciding device is operable when the type of the document being searched is the character recognition processed document, to inhibit said index information registering device from registering as the index information the unknown word extracted from the document being searched by said unknown word extracting device” and “Said document type determining device determines whether the document being searched is a character recognition processed document including character codes obtained by a character recognition process; the information searching apparatus further comprises a permitting/inhibiting designating device operable when the document being searched is the character recognition processed document, to designate whether said index information registering device is permitted or inhibited to register as the index information the unknown word extracted by said unknown word extracting device from the document being searched; and said registration permitting/inhibiting designating device is operable when the type of the document being searched is the character recognition processed document, to determine whether said index information registering device is permitted or inhibited to register as the index information the unknown word extracted by said unknown word extracting device, based on the designation by said permitting/inhibiting designating device”

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Since Yasujima discloses a dictionary to correct the unknown word from the image data (col. 1, lines 5 – 41 of Yasujima), the document type determining device (named entity identification module) can determine whether the document being searched is a character recognition processed document including character codes obtained by a character recognition process, and said registration permitting/inhibiting determining device is operable when the document being searched is the character recognition processed document, to inhibit said index information registering device from registering as the index information the unknown word extracted from the document being searched by said unknown word extracting device.

♦ As per claim 4, the combination of Morton and Yasujima disclose:

Morton discloses this limitation by registering the words extracted from the document into the search index.

♦ As per claim 5, the combination of Morton and Yasujima disclose:

- “A character correcting device” See col. 1, lines 5 – 41 of Yasujima.

♦ As per claims 6 - 7, the combination of Morton and Yasujima disclose:

- “A character recognition processing device” corresponds to the OCR device in Morton patent.
- “A word dictionary” corresponds to the dictionary in Yasujima (See col. 1, lines 5 – 41 of Yasujima).

♦ As per claim 8, the combination of Morton and Yasujima disclose:

- “File name extension” See paragraph 0060 of Morton.

Response to Arguments

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5. Applicant's arguments filed 1/3/2007 have been fully considered but they are not persuasive.

♦ Applicant argues that “neither Morton et al. or Yasujima et al disclose “an unknown word extracting device that extracts an unknown word which is not in a dictionary from the document being searched””. The Examiner respectfully disagrees.

As discussed above, Yasujima discloses a method for extracting unknown character and using a dictionary to correct it. However, incase the unknown word is not match to the dictionary, (clearly not in a dictionary), the system can also register it into the index (See Fig. 11, col. 9, lines 18 – 20 of Yasujima). Therefore, the combination of Morton and Yasujima does disclose “an unknown word extracting device that extracts an unknown word which is not in a dictionary from the document being searched”

♦ Applicant argues that the Morton and Yasujima fails to disclose “a registration permitting/inhibiting deciding device that decides, when the type of the document being searched is the recognition processed document, to inhibit said index information registering device from registering as the index information the unknown word extracted from the document being searched by said unknown word extracting device”. The Examiner respectfully disagrees.

Yasujima teaches that the OCR recognizes the unknown word from the image data and corrects the unknown word using the data dictionary (col. 1, lines 5 – 41 of Yasujima). In Fig. 11, Yasujima teaches a method for “registration a file name” and “registration and addition of character” (col. 9, lines 18 – 20 of Yasujima). Therefore, if the unknown word which is not in a dictionary, (word that does not match with the dictionary), the system of Yasujima also can be able to register that unknown word into the system; and also determined if the file is the

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Conclusion

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to CamLinh Nguyen whose telephone number is (571) 272 - 4024. The examiner can normally be reached on Monday-Friday.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Apu Mofiz can be reached on (571) 272 - 4080. The fax phone number for the organization where this application or proceeding is assigned is 571 - 273 - 8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Nguyen, Cam-Linh

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Apu Mofiz
Apu Mofiz
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